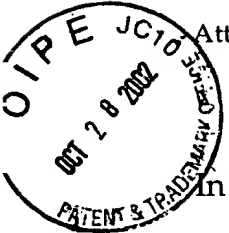


15-30-02

#6 2621



Attorney's Docket No. 074451.P042X2

PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In Re Patent Application of:

Edward L. Schwartz

Examiner: Unknown

Application No.: 09/704,991

Art Unit: 2621

Filed: November 2, 2000

For: REVERSIBLE EMBEDDED
WAVELET SYSTEM
IMPLEMENTATION

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Commissioner for Patents
Washington, DC 20231

INFORMATION DISCLOSURE STATEMENT

Sir:

Enclosed is a copy of Information Disclosure Citation Form PTO-1449 together with copies of the documents cited on that form. It is respectfully requested that the cited documents be considered and that the enclosed copy of Information Disclosure Citation Form PTO-1449 be initialed by the Examiner to indicate such consideration and a copy thereof returned to applicant(s).

Pursuant to 37 C.F.R. § 1.97, the submission of this Information Disclosure Statement is not to be construed as a representation that a search has been made and is not to be construed as an admission that the information cited in this statement is material to patentability.

Pursuant to 37 C.F.R. § 1.97, this Information Disclosure Statement is being submitted under one of the following (as indicated by an "X" to the left of the appropriate paragraph):

X 37 C.F.R. §1.97(b); OR

10/31/2002 TBESHAN1 00000001 09704991

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_____ 37 C.F.R. §1.97(c). If so, then enclosed with this Information Disclosure Statement is one of the following:

_____ A statement pursuant to 37 C.F.R. §1.97(e) or

_____ A check for \$180.00 for the fee under 37 C.F.R. § 1.17(p); OR

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_____ STATEMENT UNDER 37 C.F.R. §1.97(e)_I hereby certify:

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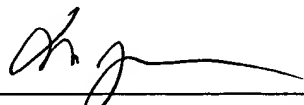
_____ That no item of information contained in the accompanying Information Disclosure Statement was cited in a communication from a foreign patent office in a counterpart foreign application, and, to the knowledge of the undersigned attorney after making reasonable inquiry, no item of information contained in the Information Disclosure Statement was known to any individual designated in §1.56(c) more than three months prior to the filing the Information Disclosure Statement.

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If there are any additional charges, please charge Deposit Account No. 02-2666.
Respectfully submitted,

BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN LLP

Dated: 10/28/02



Michael J. Mallie, Reg. No. 36,591

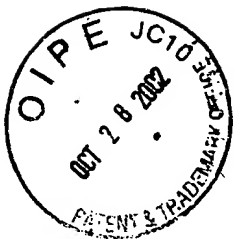
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(Date signed)

Serial/Patent No.: 09/704,991 Filing/Issue Date: November 2, 2000

Client: Ricoh

Title: Reversible Embedded Wavelet System Implementation

BSTZ File No.: 074451.P042X2

Atty/Secy Initials: MJM/aht

Date Mailed: 10-28-02

Docket Due Date: **

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| <input type="checkbox"/> Application - Provisional (____ pgs.) | <input type="checkbox"/> Preliminary Amendment (____ pgs.) |
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☒ Other: copies of cited art

Substitute for Form 1449A/PTO (Modified)

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(use as many sheets as necessary)

Complete if Known

Application Number	09/704,991
Filing Date	November 2, 2000
First Named Inventor:	Edward L. Schwartz
Group Art Unit	2621
Examiner Name	Unknown
Attorney Docket Number	74451.P042X2

Sheet 1 of 5

U.S. PATENT DOCUMENTS

Exam. Initial*	Cite No. ¹	U.S. Patent Document		Name of Patentee or Applicant of Cited Document	Date of Publication of Cited Document MM-DD-YYYY	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number Code ²	Kind (If known)			
	A	4985927		Norwood et al.	01/15/1991	
	B	4987480		Lipmann et al.	01/22/1991	
	C	5000183		Bonnefous	03/19/1991	
	D	5001764		Wood et al.	03/19/1991	
	E	5014134		Lawton et al.	05/07/1991	
	F	5018210		Merryman et al.	05/21/1991	
	G	5068911		Resnikoff et al.	11/26/1991	
	H	5073964		Resnikoff	12/17/1991	
	I	5095447		Manns et al.	03/10/1992	
	J	5101446		Resnikoff et al.	03/31/1992	
	K	5103306		Weiman et al.	04/07/1992	
	L	5121191		Cassereau et al.	06/09/1992	
	M	5124930		Nicolas et al.	06/23/1992	
	N	5128757		Citta et al.	07/07/1992	
	O	5148498		Resnikoff et al.	09/15/1992	
	P	5152953		Ackerman	10/06/1992	
	Q	5156943		Whitney	10/20/1992	
	R	5173880		Duren et al.	12/22/1992	
	S	5420891		Akansu	05/30/1995	
	T	3580655		Leith et al.	05/25/1971	

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		Office ³	Number ⁴	Kind Code ⁵ (If known)				
	U	WO	9423385			10/13/1994		
	V	EP	0622741			03/30/1994		
	W	UK	2284121			05/24/1995		
	X	WO	9609718			03/28/1996		
	Y	WO	9519683			07/20/1995		
	Z	EP	0701375			03/13/1996		
	AA	UK	2211691			07/05/1989		

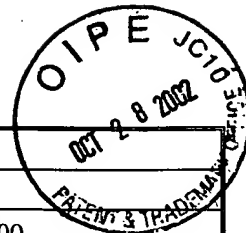
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Substitute for Form 1449A/PTO (Modified)				Complete if Known		
INFORMATION DISCLOSURE STATEMENT BY APPLICANT <i>(use as many sheets as necessary)</i>				Application Number	09/704,991	
				Filing Date	November 2, 2000	
				First Named Inventor:	Edward L. Schwartz	
				Group Art Unit	2621	
				Examiner Name	Unknown	
Sheet	2	of	5	Attorney Docket Number	74451.P042X2	
U.S. PATENT DOCUMENTS						
Exam. Initial*	Cite No. ¹	U.S. Patent Document		Name of Patentee or Applicant of Cited Document	Date of Publication of Cited Document MM-DD-YYYY	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number Code ²	Kind (If known)			
	BB	3950103		Schmidt-Weinmar	04/13/1976	
	CC	4136954		Jamieson	01/30/1979	
	DD	4223354		Noble et al.	09/16/1980	
	EE	4599567		Goupillaud et al.	07/08/1986	
	FF	4663660		Fedeles et al.	05/05/1987	
	GG	4701006		Perlmutter	10/20/1987	
	HH	4760563		Beylkin	07/26/1988	
	II	4785349		Keith et al.	11/15/1988	
	JJ	4805129		David	02/14/1989	
	KK	4817182		Adelson et al.	03/28/1989	
	LL	4821223		David	04/11/1989	
	MM	4827336		Acampora et al.	05/02/1989	
	NN	4829378		LeGall	05/09/1989	
	OO	4837517		Barber	06/06/1989	
	PP	4864398		Avis et al.	09/05/1989	
	QQ	4897717		Hamilton et al.	01/30/1990	
	RR	4904073		Lawton et al.	02/27/1990	
	SS	4929223		Walsh	05/29/1990	
	TT	4936665		Whitney	06/26/1990	
	UU	4974187		Lawton	11/27/1990	
	VV	4982283		Acampora	1/1/1991	

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		Office ³	Number ⁴ Code ⁵	Kind (If known)				
	WW	EP	0593013			04/20/1994		
	XX	EP	0510933			10/28/1992		
	YY	WO	8810049			12/15/1988		

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Substitute for Form 1449A/PTO (Modified) INFORMATION DISCLOSURE STATEMENT BY APPLICANT <i>(use as many sheets as necessary)</i>				Complete if Known	
				Application Number	09/704,991
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				Group Art Unit	2621
				Examiner Name	Unknown
Sheet	5	of	5	Attorney Docket Number	74451.P042X2
OTHER ART – NO PATENT LITERATURE DOCUMENTS					
Examiner Initials*	Cite No ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published			T ²
	WWW	1977 IEEE International Conference on Acoustics Speech & Signal Processing, "Application of Quadrature Mirror Filters to Split Band Voice Coding Schemes", D. Esteban and C. Galand, pp. 191-195.			
	XXX	Martin Vetterli, "Filter Banks Allowing Perfect Reconstruction", <u>Signal Processing 10</u> , (1986), pp. 219-244.			
	YYY	R.E. Crochiere, S.A. Webber, J.L. Flanagan, "Digital Coding of Speech in Sub-bands", 1976, American Telephone and Telegraph Company, The Bell System Technical Journal, Vol. 55, No. 8, October 1976, pp. 1069-1085.			
	ZZZ	John W. Woods and Sean D. O'Neil, "Sub-band Coding of Images", <u>Proceedings ICASSP 86</u> , Tokyo, Japan, April 1986, pp. 1005-1008.			
	AAAA	"Proceedings: ICASSP 87", 1987 International Conference on Acoustics, Speech, and Signal Processing, April 6, 7, 8, 9, 1987, Volume 3 of 4, "Sub-band coding of Images Using Predictive Vector Quantization", P.H. Westernick, J. Biemond and D.E. Boekee, pp. 1378 – 1381.			
	BBBB	Mark J.T. Smith and Thomas P. Barnwell, III, "Exact Reconstruction Techniques for Tree-Structured Subband Coders", <u>IEEE Transactions on Acoustics, Speech, and Signal Processing</u> , Vol. ASSP-34, No. 3, June 1986, p. 434-441.			
	CCCC	Marvin Vetterli, "Multi-Dimensional Sub-band coding: Some Theory and Algorithms", <u>Signal Processing 6</u> (1984), pp. 97-112.			
	DDDD	H. Gharavi and Ali Tabatabai, "Sub-band coding of Digital Images Using Two-Dimensional Quadrature Mirror Filtering", <u>SPIE Vol. 707 Visual Communications and Image Processing</u> , pp. 51-61.			
	EEEE	"Proceedings: ICASSP 87", 1987 International Conference on Acoustics, Speech, and Signal Processing, April 6,7,8,9, 1987, Volume 4 of 4, "Application of Quadrature Mirror Filtering to the Coding of Monochrome and Color Images", H. Gharavi and A. Tabatabai, pp. 2384-2387.			
	FFFF	International Search report for Application No. GB 9518298.6, dated November 1995.			
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